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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/670,291	09/26/2003	Miwa Kozawa	031181	6427

38834 7590 10/03/2005

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EXAMINER

CHACKO DAVIS, DABORAH

ART UNIT PAPER NUMBER

1756

DATE MAILED: 10/03/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/670,291

Applicant(s)

KOZAWA ET AL.

Examiner

Daborah Chacko-Davis

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 19 August 2005.
2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
4a) Of the above claim(s) _____ is/are withdrawn from consideration.
5) ☐ Claim(s) _____ is/are allowed.
6) ☒ Claim(s) 1-20 is/are rejected.
7) ☐ Claim(s) _____ is/are objected to.
8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Double Patenting

1. A rejection based on double patenting of the "same invention" type finds its support in the language of 35 U.S.C. 101 which states that "whoever invents or discovers any new and useful process ... may obtain a patent therefor ..." (Emphasis added). Thus, the term "same invention," in this context, means an invention drawn to identical subject matter. See *Miller v. Eagle Mfg. Co.*, 151 U.S. 186 (1894); *In re Ockert*, 245 F.2d 467, 114 USPQ 330 (CCPA 1957); and *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970).

A statutory type (35 U.S.C. 101) double patenting rejection can be overcome by canceling or amending the conflicting claims so they are no longer coextensive in scope. The filing of a terminal disclaimer cannot overcome a double patenting rejection based upon 35 U.S.C. 101.

2. Claims 1-20, are provisionally rejected under 35 U.S.C. 101 as claiming the same invention as that of claims 1,2, 6-7,10-13, 18-28, and 33-36, of copending Application No. 10/305,258 (USPGPUB 2003/0157801, Kozawa et al, herein after referred to as Kozawa). This is a provisional double patenting rejection since the conflicting claims have not in fact been patented.

Claims 1, 18, and 21, of Kozawa, teaches a resist pattern thickening material, that includes a resin, a cyclic structure, an organic solvent, and a surfactant (claims 1, 9, 13). Claim 2, of Kozawa, teaches that the resist pattern thickening material is water-soluble and alkali-soluble (claim 2). Claims 19, and 20, of Kozawa, teaches the

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surfactants recited in claims 3, and 4, of the instant application. Claims 11, 12, and 13, of Kozawa, teaches that the resin is water-soluble and alkali-soluble, and is selected from a polyvinyl alcohol, a polyvinyl acetal, and a polyvinyl acetate (claims 5, and 6). Claim 10, of Kozawa, teaches the cyclic structure recited in claims 8, and 11, of the instant application. Claim 2, of Kozawa, discloses that the cyclic structure is water-soluble and alkali-soluble (claim 10). Claims 6, and 7, of Kozawa, teaches the aromatic and alicyclic cyclic structures recited in claim 12 of the instant application. Claim 22, of the Kozawa, teaches the organic solvents recited in claim 14 of the instant application. Claims 18, and 23-27, of Kozawa, teaches a resist pattern thickening material of the claimed composition formed on a surface of the resist pattern to be thickened (claims 15, and 16). Claim 28, of Kozawa, teaches that the development of the resist pattern thickening material is performed after applying the resist pattern thickening material (claim 17). Claims 18, and 33-34, of Kozawa, teaches a process for forming a semiconductor device comprising forming a resist pattern to be thickened on an underlying layer, applying a resist pattern thickening material on the resist pattern to be thickened, patterning the underlying layer by etching using the resist pattern as the mask, wherein the resist pattern thickening material comprises a surfactant, and a resin (claims 18, and 19). Claims 35-36, of Kozawa, teaches that the resist pattern to be thickened comprises a material recited in claim 20 of the instant application.

Response to Arguments

3. Applicant's arguments, see Amendment (RCE), filed August 19, 2005, with respect to Claims 1-20, have been fully considered and are persuasive. The 103

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rejection of claims 1-20, made in the previous office action (paper no. 0514) has been withdrawn. However, upon further consideration, a provisional double patenting rejection is made over claims 1-20.

Conclusion

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Daborah Chacko-Davis whose telephone number is (571) 272-1380. The examiner can normally be reached on M-F 9:30 - 6:00. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mark F Huff can be reached on (571) 272-1385. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

dcd


September 28, 2005.


JOHN A. MCPHERSON
PRIMARY EXAMINER